AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

LISTING OF CLAIMS:

1.   (Currently Amended) A method for identifying objects in an image comprising:

receiving an image with a first resolution, the image representing a scene including physical objects;

transforming, by a computer, the image at the first resolution to an image at a second resolution, the first resolution being higher than the second resolution;

processing, by the computer, the image at the second resolution to identify an object, from among the physical objects included in the received image, in the image at the second resolution;

selecting a detection algorithm from among plural detection algorithms based on a condition associated with the object identified at the second resolution; and

processing, by the computer, the image at the first resolution using the object identified at the second resolution to identify another object, from among the physical objects included in the received image, in the image at the first resolution according to the selected detection algorithm.

2.   (Previously Presented) The method of claim 1, further comprising:

transforming the image at the second resolution to an image at a third resolution, the second resolution being higher than the third resolution; and

processing the image at the third resolution to identify yet another object from among the physical objects, wherein the yet another object is employed in the identification of the object and the another object.

3.   (Previously Presented) The method of claim 2, wherein:

the transforming of the image at the first resolution includes downsampling the image from the first resolution to the second resolution; and

the transforming of the image at the second resolution includes downsampling the image from the second resolution to the third resolution.

4.   (Previously Presented) The method of claim 1, wherein at least one of the processing of the image at the second resolution and the processing of the image at the first resolution is performed as a function of a type of terrain in the image at the second resolution and the image at the first resolution, respectively.

5.   (Original) The method of claim 4, wherein the type of terrain is identified using a priori information and a gray level co-occurrence identification.

6.   (Previously Presented) The method of claim 1, further comprising:

determining whether the object and the another object are desired objects based upon a context associated with at least one of the image at the first resolution and the image at the second resolution.

7.   (Original) The method of claim 1, wherein the object is a river.

8.   (Previously Presented)   The method of claim 2, wherein the

processing of the image at the third resolution comprises:

identifying portions of the image at the third resolution containing clouds;

and

identifying portions of the image at the third resolution containing bodies of

water, wherein if portions of the image at the third resolution are identified which

contain clouds or bodies of water, identifying the clouds or bodies of water as the yet

another object.

9.   (Previously Presented) The method of claim 8, wherein the identified

portions of the image at the third resolution containing clouds or bodies of water are

employed in the identification of objects in the image at the second resolution and

other objects in the image at the first resolution.

10-49. (Canceled)

50.   (Previously Presented) The method of claim 1, wherein the selected

detection algorithm for identifying the other object at the first resolution is

automatically selected from among the plural detection algorithms.

51.   (Previously Presented) The method of claim 1, wherein the plural

detection algorithms include at least two algorithms respectively corresponding to

gray level co-occurrence identification, linear object identification, primitive extraction

identification, cloud masking, river masking, activity detection identification, edge
extraction identification, gradient magnitude thresholding, busy mask identification,
gradient direction edge thinning, line extraction identification, segmentation, region
merging, collinear line identification, parallel line identification, parallel edge
identification, intensity valuation identification, intensity variance identification, small
object detection, morphological filtering, structure detection, lines of communication
detection, and contextual line reasoning.

52.   (Previously Presented) The method of claim 2, wherein the selecting of
the detection algorithm includes selecting the detection algorithm from among the
plural detection algorithms based on the condition associated with the object
identified at the second resolution, and a condition associated with the yet another
object identified at the third resolution.

53.   (Previously Presented) The method of claim 1, wherein:
the processing of the image at the second resolution includes processing the
image at the second resolution according to a first detection algorithm;
the selecting of the detection algorithm includes selecting a second detection
algorithm, which is different from the first detection algorithm, from among the plural
detection algorithms based on the condition associated with the object identified at
the second resolution; and
the processing of the image at the first resolution includes processing the
image at the first resolution according to the selected second detection algorithm.

54.   (Previously Presented) The method of claim 1, wherein the receiving of the image includes receiving the image at the first resolution from at least one of an imaging device and a photographic device.

55.   (Previously Presented) The method of claim 1, wherein the condition associated with the object identified at the second resolution includes at least one of a geographic location, a terrain type, a ground sample distance, weather, a time of day, temperature, a viewing condition, a band frequency of a sensor, a degree of freedom of the sensor, a viewing angle of the sensor, and a positional vector.

56.   (Previously Presented) The method of claim 1, comprising:

displaying the object identified at the second resolution and the another object identified at the first resolution on a display device.

57.   (Previously Presented) A computer-readable recording medium having a computer program recorded thereon that causes a computer to identify objects in an image, the program causing the computer to perform operations comprising:

receiving an image with a first resolution;

processing the image at a second resolution to identify an object in the image at the second resolution;

selecting a detection algorithm from among plural detection algorithms based on a condition associated with the object identified at the second resolution; and

processing the image at the first resolution using the object identified at the second resolution to identify another object in the image at the first resolution according to the selected detection algorithm.

58.   (Previously Presented) The computer-readable recording medium of claim 57, wherein the condition associated with the object identified at the second resolution includes at least one of a geographic location, a terrain type, a ground sample distance, weather, a time of day, temperature, a viewing condition, a band frequency of a sensor, a degree of freedom of the sensor, a viewing angle of the sensor, and a positional vector.

59.   (Previously Presented) The computer-readable recording medium of claim 57, wherein the program causes the computer to perform operations comprising:

transforming the image at the second resolution to an image at a third resolution, the second resolution being higher than the third resolution;

processing the image at a third resolution to identify yet another object; and

employing the yet another object in the identification of the object and the another object.

60.   (Previously Presented) The computer-readable recording medium of claim 59, wherein the operation of selecting the detection algorithm includes selecting the detection algorithm from among the plural detection algorithms based

on the condition associated with the object identified at the second resolution and a condition associated with the yet another object identified at the third resolution.

61.   (Previously Presented) The computer-readable recording medium of claim 57, wherein the plural detection algorithms include at least two algorithms respectively corresponding to gray level co-occurrence identification, linear object identification, primitive extraction identification, cloud masking, river masking, activity detection identification, edge extraction identification, gradient magnitude thresholding, busy mask identification, gradient direction edge thinning, line extraction identification, segmentation, region merging, collinear line identification, parallel line identification, parallel edge identification, intensity valuation identification, intensity variance identification, small object detection, morphological filtering, structure detection, lines of communication detection, and contextual line reasoning.

62.   (Previously Presented) The computer-readable recording medium of claim 57, wherein:

the operation of processing the image at the second resolution includes processing the image at the second resolution according to a first detection algorithm;

the operation of selecting the detection algorithm includes selecting a second detection algorithm, which is different from the first detection algorithm, from among the plural detection algorithms based on the condition associated with the object identified at the second resolution; and

the operation of processing the image at the first resolution includes

processing the image at the first resolution according to the selected second

detection algorithm.

63.   (Previously Presented) The computer-readable recording medium of

claim 57, wherein the program causes the computer to determine whether the object

and the another object are desired objects based upon a context associated with at

least one of the image at the first resolution and the image at the second resolution.

64.   (Previously Presented) The computer-readable recording medium of

claim 57, wherein the program causes the computer to display at least one of the

object identified at the second resolution and the another object identified at the first

resolution on a display device communicatively connected to the computer.